

What is claimed is:

- 1 1. A device to control a sense amplifier, comprising:
2 a resettable control circuit containing a first input, a second input, a third input, and an
3 output; said first input coupled to said output or to a ground; said second input coupled to receive
4 a start signal; said third input coupled to receive output signals of said sense amplifier; and said
5 output coupled to said sense amplifier.
- 1 2. The device of claim 1 wherein said first input, said second input, said third input, and
2 said output are initially low; when said second input goes high and then goes low again, said
3 output goes high; when said third input goes high, said output goes low.
- 1 3. The device of claim 1 further comprising:
2 a reset signal generator, containing a first input coupled to an OUT end of said sense
3 amplifier, a second input coupled to an OUTB end of said sense amplifier, and an output coupled
4 to said third input of said resettable control circuit; and
5 when either OUT or OUTB reaches a predetermined low voltage level, said output of
6 said reset signal generator goes high.
- 1 4. The device of claim 1 wherein said resettable control circuit is a flip-flop circuit
- 1 5. The device of claim 4 wherein said flip-flop circuit is a D flip-flop circuit.
- 1 6. The device of claim 5 wherein said first input is a data signal for said D flip-flop circuit.
- 1 7. The device of claim 5 wherein said start signal is a triggered clock for said D flip-flop
2 circuit.
- 1 8. The device of claim 7 wherein said start signal is a pseudo word line signal.
- 1 9. The device of claim 5 wherein said third input is a reset signal for said D flip-flop circuit.

10. The device of claim 5 wherein said first input being a data signal for said D flip-flop, said second input being a triggered clock for said D flip-flop, said third input being a reset signal for said D flip-flop, and said output are initially low; when said triggered clock goes high and then goes low again, said output goes high; when said reset signal goes high, said output goes low.

11. The device of claim 5 wherein said resettable control circuit further comprises a first passgate, a second passgate, a third passgate, and fourth passgate; a first inverter, a second inverter, a third inverter, a fourth inverter, a fifth inverter, and a sixth inverter; and a first NAND gate;

said first input of said resettable control circuit is coupled to an input end of said first passgate, an output end of said first passgate is coupled to an output end of said second passgate and an input end of said third inverter;

said second input of said resettable control circuit is coupled to an input end of said first inverter; a C end of said first passgate, a CB end of said second passgate, a CB end of said third passgate, and a C end of said fourth passgate;

said third input of said resettable control circuit is coupled to an input end of said second inverter;

an output end of said first inverter is coupled to a CB end of said first passgate, a C end of said second passgate, a C end of said third passgate, and a CB end of said fourth passgate;

an output end of said third inverter is coupled to a first input end of said first NAND gate and to an input end of said third passgate;

an output end of said second inverter is coupled to a second input end of said first NAND gate, an output end of said first NAND is coupled to an input end of said second passgate;

an output end of said third passgate is coupled to an input end of said fourth inverter and to an output end of said fourth passgate;

an output end of said fourth inverter is coupled to an input end of said fifth inverter and to an input end of said sixth inverter;

an output end of said fifth inverter is coupled to an input end of said fourth passgate;

an output end of said sixth inverter is coupled to said output of said resettable control circuit.

- 1 12. The device of claim 11, further comprising:
 - 2 a reset signal generator, containing a NAND gate, a first input of said NAND gate, a
 - 3 second input of said NAND gate, an output of said NAND gate;
 - 4 said first input coupled to an OUT end of said sense amplifier, said second input coupled
 - 5 to an OUTB end of said sense amplifier, and said output coupled to said third input of said
 - 6 resetable control circuit.